

December 13, 2005

Mr. Jack R. Strosnider, Director
Office of Nuclear Material Safety
and Safeguards
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555-0001

Dear Mr. Strosnider:

I am writing in response to your letter of October 18, 2004, regarding the Kerr McGee Corporation's Cushing Refinery Site, Cushing, OK (Cushing). The October 18 letter notified EPA that the Cushing site would have triggered an NRC consultation with EPA in accordance with the 2002 Memorandum of Understanding (MOU) entitled: "[Consultation and Finality on Decommissioning and Decontamination of Contaminated Sites](#)" (OSWER No. 9295.8-06, signed by EPA on September 6, 2002, and NRC on October 9, 2002). This letter responds to the notification in accordance with Section V.D.1 of the MOU, when NRC requests EPA's consultation on a decommissioning plan or a license termination plan, EPA is obligated to provide written notification of its views within 90 days of NRC's notice.

Your letter constitutes a Level 2 consultation as specified in the MOU because the consultation is concerning residual radioactive contamination remaining after completion of the Final Status Survey (FSS).

The views expressed by EPA in this letter regarding NRC's decommissioning are limited to discussions related to the MOU. The comments provided here do not constitute guidance related to the cleanup of sites under Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) authority.¹ EPA's views on the matters addressed by this letter were developed from information furnished by NRC in the October 18 letter, other materials provided by NRC, and staff discussions.

EPA Consultation Views

¹Please see the memorandum entitled: "[Distribution of Memorandum of Understanding between EPA and the Nuclear Regulatory Commission](#)" (OSWER No. 9295.8-06a, October 9, 2002) which includes guidance to the EPA Regions to facilitate Regional compliance with the MOU and to clarify that the MOU does not affect CERCLA actions that do not involve NRC (e.g., the MOU does not establish cleanup levels for CERCLA sites). This memorandum may be found on the Internet at: <http://www.epa.gov/superfund/resources/radiation/pdf/transmou2fin.pdf>.

Today's response is limited to those matters that initiated NRC's request for consultation in its letter of October 18. NRC initiated this consultation because the MOU trigger values for one radionuclide (total uranium) in groundwater were found to exceed maximum contaminant levels (MCLs) established under the Safe Drinking Water Act (SDWA) after the Final Status Survey (FSS).

EPA Policy on Ground water:

"EPA expects to return usable ground waters to their beneficial uses whenever practicable." (see 40 CFR §300.430(a)(1)(iii)(F)). In general, drinking water standards such as MCLs provide relevant and appropriate cleanup levels for ground waters that are a current or potential source of drinking water. However, drinking water standards such as MCLs generally are not relevant and appropriate for ground waters that are not a current or potential source of drinking water (see 55 FR 8732, March 8, 1990).

EPA issued guidance concerning ground water use determinations in a memo from Office of Solid Waste and Emergency Response Assistant Administrator to the Regions entitled "[The Role of CSGWPPs in EPA Remediation Programs](#)" (OSWER Directive 9283.1-09), April 4, 1997. This guidance states that EPA generally defers to State determination of current and future groundwater uses, when the State has a Comprehensive State Ground Water Protection Program (CSGWPP) that has been endorsed by EPA and has provisions for sites specific decisions. For States that do not have an EPA-endorsed CSGWPP (or whose CSGWPPs do not have provisions for making site-specific determinations of groundwater use, resource value, priority or vulnerability), EPA uses either "EPA Guidelines for Ground-Water Classification" (Final Draft, December 1986), or State groundwater classifications or similar State designations, whichever classification scheme leads to more stringent remediation goals.

NRC Groundwater Determination at Cushing:

The state of Oklahoma does have an EPA endorsed CSGWPP. The NRC licensee did seek the opinion of the Oklahoma Department of Environmental Quality in making its determination, and the state responded that the groundwater at the Cushing site was not a potential or current source of drinking water.² NRC incorporated this state determination in its review of the Cushing site. In this case (EPA endorsed CSGWPP), the state classification is used by EPA in determining cleanup ARARs for groundwater. In addition, NRC determined in its review of the "EPA Guidelines for Ground-Water Classifications" that the groundwater at Cushing was a Class III because of low yield, and therefore not a potential source of drinking water.³ NRC appears to have used a similar process that EPA would

²See [letter from Darrell Shults, Oklahoma Department of Environmental Quality to Jeff Lux, Kerr-McGee Corporation](#), on September 19, 1997.

³See Federal Register notice "[Finding of No Significant Impact Related to Amendment of Materials License No. SNM-1999, Kerr-McGee Corp., Cushing Refinery Site Cushing, Oklahoma](#)" (62 FR 45982, August 23, 1999)

have used to determine groundwater use if the Cushing site were addressed by EPA under CERCLA. If Cushing were a CERCLA site, and EPA had made the same determination that NRC did that the groundwater was not a potential or current source of drinking water, EPA most likely would not have considered drinking water standards such as MCLs to be ARARs when establishing cleanup levels for the site.

Conclusion

Based on EPA's review of the information provided by NRC, EPA is satisfied with how NRC addressed the issues raised by NRC for this consultation. EPA staff will remain available to NRC for consultation if needed at the site. If you have any questions regarding this letter, please contact me or have your staff contact Stuart Walker of my staff at (703) 603-8748.

Sincerely,

/s/ mbc

Michael B. Cook, Director
Office of Superfund Remediation
and Technology Innovation